DEPARTMENT OF LICENSING AND REGULATORY AFFAIRS

DIRECTOR'S OFFICE

CONSTRUCTION CODE

Filed with the Secretary of State on These rules take effect 120 days after filing with the Secretary of State

(By authority conferred on the director of the department of licensing and regulatory affairs by section 4 of 1972 PA 230, MCL 125.1504, and Executive Reorganization Order Nos. 2003-1, 2008-4, 2011-4, MCL 445.201, 1 445.2025, and 445.2030)

R of the Michigan Administrative Code are amended and R are rescinded as follows:

PART 5. RESIDENTIAL CODE

R 408.30500 Applicable code.

Rule 500. The provisions of the international residential code, 2015 edition, including appendices A, B, C, D, E, F, G, J, K, N, O, P, R, and S except for Sections R 103.1 R103.2, R103.3, R104.2, R104.3, R104.5, R104.6, R104.7, R104.8, R104.8.1, R 104.10, R 105.3, R 105.3.1, R 105.3.2, R 105.6, R 105.9, R106.2, R108.1, to R108.2, R108.3, R108.4, R108.5, R108.6, R109.1, R109.1.5, R110.1, R110.2, R112.2, R112.3, R112.4, R113.1 to R113.3, R113.4, R114.1 and R114.2 R313.1.1 to R313.2.1, R602.11, R602.12, N1102.3.2, tables R507.2.3, N1101.12.3(3) and figure R507.2.1(2), R507.2.3(1), R507.2.3(2), and 507.2.4, sections M1411.8, G2411.1.1.1 to G2411.1.1.5, G2439.7.2, P2503.9, P2709.2.3, P2904.1.1 to P2904.8.2, P2905.1, P2905.2, figure P2904.2.4.2, table P2904.2.2, tables P2904.6.2(1) to P2904.6.2(9), P3009.1 to P3009.11.1, E3902.15, E3902.16, E3902.17, and AJ102.4, the IBC-2015, IECC-2015, IMC-2015, IPC-2015, NFPA 70-2014 listed in chapter 44 govern the construction, alteration, relocation, demolition, use, and occupancy of buildings and structures, and, with exceptions noted, the international residential code is adopted by reference in these rules. All references to the International Building Code, International Residential Code, International Energy Conservation Code, National Electrical Code, International Existing Building Code, International Mechanical Code, and International Plumbing Code mean the Michigan Building Code, Michigan Residential Code, Michigan Energy Code, Michigan Electrical Code, Michigan Rehabilitation Code for Existing Buildings, Michigan Mechanical Code, and Michigan Plumbing Code respectively. The codes are available for inspection at the Okemos office of the Michigan Department of Licensing and Regulatory Affairs, Bureau of Construction Codes. The codes may be purchased from the International Code Council, 500 New Jersey Avenue, N.W., 6th Floor, Washington, D.C. 20001, or from the Michigan Department of Licensing and Regulatory Affairs, Bureau of Construction Codes, 2501 Woodlake Circle, Okemos, Michigan 48864, at a cost as of the time of adoption of these amendatory rules of \$118.00.

R 408.30501b Intent.

Rule 501b. Sections 101.3 and 101.4 of the code are amended to read as follows: R101.3. Intent. The purpose of this code is to establish minimum requirements to safeguard the public safety, health and general welfare through affordability, structural strength, means of egress facilities, stability, sanitation, light and ventilation, energy conservation and safety to life and property from fire and other hazards attributed to the built environment and to provide safety to fire fighters and emergency responders during emergency operations. Stille-DeRossett-Hale single state construction code act, 1972 PA 230, takes precedence over all provisions of this code.

R101.4. Severability. If any section, subsection, sentence, clause or phrase of this code is for any reason held to be unconstitutional, such decision shall not affect the validity of the remaining portions of this code.

R 408.30501c Existing structures.

Rule 501c. Section 102.7 is amended to read as follows:

R102.7. Existing structures. The legal occupancy of any structure existing on the date of adoption of this code shall be permitted to continue without change, except as is specifically covered in this code, the international property maintenance code or the international fire code.

R 408.30503 Approved materials and equipment.

Rule 503. Sections R104.9 of the code is amended to read as follows:

R104.9. Approved materials and equipment. Materials, equipment, and devices shall be constructed or installed in accordance with approvals granted under the act or by the building official. The building official shall review reports prepared by recognized evaluation services and determine if the intent of the code is met.

R 408.30504 Duties and powers of building official.

Rule 504. Sections **R104.1**, R104.6 and R104.11 of the code are amended to read as follows:

R104.1. General. The building official is hereby authorized and directed to enforce the provisions of this code. The building official shall have the authority to adopt procedures in order to clarify the application of this code.

-R104.6. Right of entry. In the discharge of duties, the code official may enter any building, structure, or premises in the jurisdiction to enforce the provisions of the act and the code

R104.11. Alternative materials, design, and methods of construction and equipment. The provisions of the code are not intended to prevent the installation of any material or to prohibit any design or method of construction not specifically prescribed by the code, if the alternative has been approved. An alternative material, design, or method of construction shall be approved where the building official finds that the proposed design is satisfactory and complies with the intent of the provisions of the code, and that the material, method, or work offered is, for the purpose intended, at least the equivalent of that prescribed in the code. Compliance with the specific performance-based provisions of the Michigan building, R 408.30401 to R 408.30547, electrical, R 408.30801 to R 408.30880, mechanical, R 408.30901 to R 408.30998, and plumbing, R 408.30701 to R 408.30796, codes instead of specific requirements of the code shall also be permitted as an alternate.

R 408.30505 Work exempt from permitPermits.

Rule 505. Section R105.2 of the code is amended to read as follows:

- R105.2. Work exempt from permit. Exemption from the permit requirements of the code shall not be deemed to grant authorization for any work to be done in any manner in violation of the provisions of the code or any other laws or ordinances of this jurisdiction. Permits are not required for any of the following:
- (a) Building permits shall not be required for any of the following:
- (i) One-story detached accessory structures, if the floor area does not exceed 200 square feet (18.58 m₂).
- (ii) A fence that is not more than 7 feet (2 134 mm) high.
- (iii) A retaining wall that is not more than 4 feet (1 219 mm) in height measured from the bottom of the footing to the top of the wall, unless supporting a surcharge.
- (iv) A water tank supported directly upon grade if the capacity is not more than 5,000 gallons (18 927 L) and the ratio of height to diameter or width is not greater than 2 to 1.
- (v) A sidewalk and driveway not more than 30 inches (762 mm) above adjacent grade and not over any basement or story below and are not part of an accessible route.
- (vi) Painting, papering, tiling, carpeting, cabinets, counter tops, and similar finish work.
- (vii) A prefabricated swimming pool that is less than 24 inches (610 mm) deep, and not greater than 5,000 gallons (18 925 L), and is installed entirely above ground.
- (viii) Swings and other playground equipment accessory to detached 1- or 2-family dwellings.
- (ix) Window awnings in group R-3 and U occupancies, supported by an exterior wall that do not project more than 54 inches (1 372 mm) from the exterior wall and do not require additional support, as applicable in Section 101.2 and group U occupancies.
- (x) Decks, porches, patios, landings, or similar structures not exceeding 200 square feet (18.58 m2) in area, that are not more than
- 30 inches (762 mm) above grade at any point as prescribed by Section R312.1.1, are not attached to a dwelling or its accessory structures, are not within 36 inches (914 mm) of a dwelling or its accessory structures, and do not serve any ingress or egress door of the dwelling or its accessory structures.
- (b) Electrical permits shall not be required, as in accordance with the Michigan electrical code, R 408.30801 to R 408.30880, for any of the following:
- (i) Repairs and maintenance: Minor repair work, including the replacement of lamps or the connection of approved portable electrical equipment to approved permanently installed receptacles.
- (ii) Radio and television transmitting stations: The provisions of the code do not apply to electrical equipment used for radio and television transmissions, but do apply to equipment and wiring for power supply and to the installation of towers and antennas.
- (iii) Temporary testing systems: A permit is not required for the installation of any temporary system required for the testing or servicing of electrical equipment or apparatus.
- (c) Mechanical permits shall not be required for any of the following:
- (i) A portable heating or gas appliance that has inputs of less than 30,000 BTU's per hour
- (ii) Portable ventilation appliances and equipment.

- (iii) A portable cooling unit.
- (iv) Steam, hot water, or chilled water piping within any heating or cooling equipment or appliances regulated by this code.
- (v) Replacement of any minor part that does not alter the approval of equipment or an appliance or make such equipment or appliance unsafe.
- (vi) A portable evaporative cooler.
- (vii) Self-contained refrigeration systems that contain 10 pounds (4.5 kg) or less of refrigerant, or that are actuated by motors of 1 horsepower (0.75kW) or less.
- (viii) Portable fuel cell appliances that are not connected to a fixed piping system and are not interconnected to a power grid.
- (ix) An oil burner that does not require connection to a flue, such as an oil stove and a heater equipped with a wick.
- (x) A portable gas burner that has inputs of less than 30,000 BTU's per hour.
- (xi) When changing or relocating a gas meter or regulator, a permit is not required when installing gas piping which shall be limited to 10 feet (3 005 mm) in length and not more than 6 fittings.
- (xii) When installing geothermal vertical closed loops under the supervision of a mechanical contractor licensed in HVAC as long as the company meets both the following:
- (A) Has obtained a certificate of registration as a well drilling contractor pursuant to part 127 of the public health code, 1978 PA 368, MCL 333.12701 to 333.12771.
- (B) Has installed the geothermal vertical closed loops in accordance with the department of environmental quality's best practices regarding geothermal heat pump closed loops. Exemption from the permit requirements of this code shall not be deemed to grant authorization for work to be done in violation of the provisions of this code or other laws or ordinances of this jurisdiction.
 - (d) Plumbing permits shall not be required for either of the following:
- (i) The stopping of leaks in drains, water, soil, waste or vent pipe. If any concealed trap, drainpipe, water, soil, waste or vent pipe becomes defective and it becomes necessary to remove and replace the same with new material, then the work is considered as new work and a permit shall be obtained and inspection made as provided in the code.
- (ii) The clearing of stoppages or the repairing of leaks in pipes, valves, or fixtures, and the removal and reinstallation of water closets, if the repairs do not involve or require the replacement or rearrangement of valves, pipes, or fixtures.

R 408.30506 Submittal documents.

Rule 506. Sections R106.1, R106.1.1, **R106.5**, and R802.10.1 of the code are amended and Section R106.1.4 and figure 802.10.1 are added to the code to read as follows:

R106.1. Submittal documents. Construction documents, special inspection and structural program and other data shall be submitted in 1 or more sets with each application for a permit. The construction documents shall be prepared by or under the direct supervision of a registered design professional when required by 1980 PA 299, MCL 339.101 to 339.2919, and known as the Michigan occupational code. Where special conditions exist, the building official may require additional construction documents to be prepared by a registered design professional.

- R106.1.1. Information on construction documents. Construction documents shall be drawn upon suitable material. Electronic media documents may be submitted when approved by the building official. Construction documents shall be of sufficient clarity to indicate the location, nature, and extent of the work proposed and show in detail that it will conform to the provisions of this code and relevant laws, ordinances, and rules and regulations, as determined by the building official.
- R106.1.4. Truss design data. As an alternative to the submission of truss design drawings, figure R802.10.1, the truss design data sheet, may be provided to the building official as part of the construction documents at the time of application. Truss design drawings shall be submitted to the building official prior to truss installation as required by Section R802.10.1.

R106.5. Retention of construction documents. One set of approved construction documents shall be retained by the building official for a period as required by state or local laws.

R802.10.1 Truss design drawings. Truss design drawings, prepared in conformance with Section R802.10.1, shall be provided to the building official and approved prior to installation. The truss design data sheet, figure R802.10.1, may be provided to the building official at the time of permit application, as an alternative to design drawings as permitted in Section R106.1.4. Truss design drawings shall include, at a minimum, the information specified below. Truss design drawings shall be provided with the shipment of trusses delivered to the jobsite.

- (1) Slope or depth, span, and spacing.
- (2) Location of all joints.
- (3) Required bearing widths.
- (4) Design loads as applicable.
- (a) Top chord live load (including snow loads).
- (b) Top chord dead load.
- (c) Bottom chord live load.
- (d) Bottom chord dead load.
- (e) Concentrated loads and their points of application.
- (f) Controlling wind and earthquake loads.
- (5) Adjustments to lumber and joint connector design values for conditions of use.
- (6) Each reaction force and direction.
- (7) Joint connector type and description (e.g., size, thickness, or gauge) and the dimensioned location of each joint connector except where symmetrically located relative to the joint interface.
 - (8) Lumber size, species, and grade for each member.
 - (9) Connection requirements for the following:
 - (a) Truss to truss girder.
 - (b) Truss ply to ply.
- (c) Field splices.
- (10) Calculated deflection ratio and/or maximum description for live and total load.
- (11) Maximum axial compression forces in the truss members to enable the building designer to design the size, connections, and anchorage of the permanent continuous lateral bracing. Forces shall be shown on the truss design drawing or on

supplemental documents.

(12)Required permanent truss member bracing location.

R 408.30508 Payment of fees Rescind.

Rule 508. Section R108.1 of the code is amended to read as follows:

R108.1. Fees. The fees prescribed in the act shall be paid to the enforcing agency of the jurisdiction before a permit to begin work for new construction, alteration, removal, demolition, or other building operation may be issued. In addition, an amendment to a permit necessitating an additional fee shall not be approved until the additional fee is paid.

R 408.30509 Frame and masonry inspection.

Rule 509. Section R109.1.4 of the code is amended to read as follows:

R109.1.4. Frame and masonry inspection. Inspection of framing construction shall be made after the roof, all framing, firestopping, draftstopping, and bracing are in place and after the plumbing, mechanical, and electrical rough inspections are approved. Masonry inspections shall be made after the completed installation of base course flashing as specified in section R703.7.5 of the code and water-resistive barrier as specified in section R703.2 of the code and after the masonry construction is completed.

R 408.30509a Approval required.

Rule 509a. Section R109.4 of the code is amended to read as follows:

R109.4. Approval required. Work shall not be done beyond the point indicated in each successive inspection without first obtaining the approval of the building official. The building official upon notification shall make the requested inspections and shall either indicate the portion of the construction that is satisfactory as completed, or shall notify the permit holder or agent of the permit holder wherein portion of the construction fails to comply with this code. The notification shall include specific reference to the code chapter and section numbers in violation in writing. Any portions that do not comply shall be corrected and such portion shall not be covered or concealed until authorized by the building official.

R 408.30510 Use and occupancy.

Rule 510. Sections R110.1, R110.2, and Section R110.3 of the code areis amended to read as follows:

-R110.1. Use and occupancy. A building or structure shall not be used or occupied, and a change in the existing occupancy classification of a building or structure or portion thereof shall not be made, until a certificate of occupancy has been issued in accordance with the act.

R110.2. Change in use. A change in the character or use of an existing structure shall not be made, except as specified in the Michigan building code, R 408.30401 to R 408.30499.

R110.3 Certificate issued. After the building official inspects the building or structure and finds no violations of the provisions of this code or other laws that are enforced by the department of building safety, the building official shall issue a certificate of occupancy which shall contain the following:

- (a) The building permit number.
- (b) The address of the structure.
- (c) A description of that portion of the structure for which the certificate is issued.
- (d) A statement that the described portion of the structure has been inspected for compliance with the requirements of this code.
 - (e) The name of the building official.
 - (f) The edition of the code under which the permit was issued.
- (g) Any special stipulations and conditions of the building permit.

R 408.30511 Violation penalties Rescind.

Rule 511. Section R113.4 of the code is amended to read as follows:

R113.4. Violation penalties. It is unlawful for any person, firm, or corporation to violate a provision of the code or fail to conform with any of the requirements thereof, or erect, construct, alter, extend, repair, move, remove, demolish, or occupy any building, structure, or equipment regulated by the code, or cause work to be performed or done in conflict with or in violation of the approved construction documents or directive of the enforcing agency, or a permit or certificate issued under the code. A violator shall be assessed a fine in accordance with the act.

R 408.30512 Notice to owner Rescind.

Rule 512. Section R114.1 of the code is amended to read as follows:

R114.1. Notice to owner. The notice shall be in accordance with the act. Any person who is served with a stop work order, except for work that the person is directed to perform to remove a violation or unsafe condition, is subject to the penalty provisions in the act.

R 408.30513 Definitions.

Rule 513. The definitions of agricultural or agricultural purposes and building inspector are added to the code and the definitions of building, building official, registered design professional, and attic and sunroom addition in Section R202 of the code are amended, the definition of agricultural or agricultural purposes, building inspector, building, building official, and registered design professional residential building type is are deleted, and the definition of structure is added to Section R202 to read as follows: R202. Definitions.

"Agricultural or agricultural purposes" means of, or pertaining to, or connected with, or engaged in agriculture or tillage which is characterized by the act or business of cultivating or using land and soil for the production of crops for the use of animals or humans, and includes, but is not limited to, purposes related to agriculture, farming, dairying, pasturage, horticulture, floriculture, viticulture, and animal and poultry husbandry.

"Attic, uninhabitable with limited storage" means uninhabitable attics with limited storage where the minimum clear height between joists and rafters is 42 inches (1 063 mm) or greater or where there are not 2 or more adjacent trusses with web configurations capable of accommodating an assumed rectangle 42 inches (1 063 mm) high by 24 inches (610 mm) in width, or greater, within the plane of the trusses.

"Attic, uninhabitable without storage" means uninhabitable attics without storage

where the maximum clear height between joists and rafters is less than 42 inches (1 063 mm), or where there are not 2 or more adjacent trusses with web configurations capable of accommodating an assumed rectangle 42 inches (1 063 mm) high by 24 inches (610 mm) in width, or greater, within the plane of the trusses.

"Building" means a combination of materials, whether portable or fixed, forming a structure affording a facility or shelter for use or occupancy by persons, animals, or property. The term does not include a building incidental to the use for agricultural purposes of the land on which the building is located if it is not used in the business of retail trade. The term shall be construed as though followed by the words "or part or parts of the building and all equipment in the building" unless the context clearly requires a different meaning.

"Building inspector" means the person who is appointed and employed by a governmental subdivision, who is charged with the administration and enforcement of the state codes specified in R 408.30499, and who is registered in compliance with 1986 PA 54, MCL 338.2301 to 338.2313.

"Building official" means the person who is appointed and employed by a governmental subdivision, who is charged with the administration and enforcement of the state codes specified in R 408.30499, and who is registered in compliance with 1986 PA 54, MCL 338.2301 to 338.2313.

"Registered design professional" means an individual who is licensed under the occupational code, 1980 PA 299, MCL 339.101 to 339.2919.

"Structure" means that which is built or constructed, an edifice or building of any kind, or a piece of work artificially built up or composed of parts joined together in some definite manner. Structure does not include a structure incident to the use for agricultural purposes of the land on which the structure is located and does not include works of heavy civil construction including, without limitation, any of the following:

- (a) A highway.
- (b) A bridge.
- (c) A dam.
- (d) A reservoir.
- (e) A lock.
- (f) A mine.
- (g) A harbor.
- (h) A dockside port facility.
- (i) An airport landing facility.
- -(j) A facility for the generation, or transmission, or distribution of electricity. Structure shall be construed as though followed by the word "or part or parts of the structure and all equipment in the structure," unless the context clearly indicates otherwise.

"Sunroom addition" means a new structure with glazing in excess of 40% of the gross area of the structure's exterior walls and roof added to an existing dwelling.

R 408.30514 Means of appeal Rescinded.

Rule 514. Sections R112.1 and R112.3 of the code are amended to read as follows:

R112.1 Means of appeal. An interested person has the right to appeal a decision of the enforcing agency to the board of appeals in accordance with the act. An application

for appeal shall be based on a claim that the true intent of the code or the rules governing construction have been incorrectly interpreted, the provisions of the code do not apply, or an equal or better form of construction is proposed. The decision of a local board of appeals may be appealed to the construction code commission in accordance with the act and time frames.

- -Exception: Requests for barrier free design exception shall be in accordance with 1966 PA 1, MCL 125.1351 to 125.1356.
- -112.3 Qualifications. The board of appeals shall consist of members who are qualified in accordance with the act and are not employees of the governmental subdivision or the agency enforcing the code.

